

This listing of claims will replace all prior versions, and listings, of claims in the application:

Listing of the Claims:

Claims 1-30 (cancelled).

31. (previously presented): A method of producing photochromic latex comprising a stabilizing agent comprising:

obtaining an aqueous emulsion of a polymerizable mixture comprising a weight of one or more organic monomers containing C=C groups that are polymerizable by a free-radical mechanism and one or more photochromic compounds;

polymerizing the polymerization mixture to form a latex;

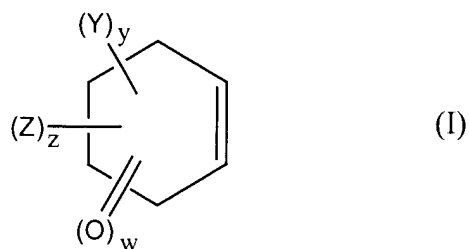
obtaining a composition comprising a weight of least one stabilization agent capable of stabilizing photochromic properties selected from the group consisting of cyclopentene compounds, cyclohexene compounds, cycloheptene compounds, cyclooctene compounds, and compounds comprising an ethylenic unsaturation not forming part of an aromatic ring and a carbon atom bearing a free hydroxy group, wherein the carbon atom is in the α position with respect to the ethylenic unsaturation; and

adding the composition comprising the stabilization agent to the polymerization mixture prior to or during polymerization of the polymerizable mixture or to the latex after polymerization;

wherein photochromic latex comprising a stabilizing agent is produced.

32. (previously presented): The method of claim 31, wherein the stabilization agent is a cyclohexene compound.

33. (previously presented): The method of claim 32, wherein the cyclohexene compound has the formula:



wherein:

any Y is, independently, an alkyl group of 1 to 4 carbon atoms;

any Z is a hydroxy group, a 2-oxoethyl group, a hydroxyalkyl group of 1 to 3 carbon atoms, an alkoxycarbonyl group of 2 to 5 carbon atoms, or a R'COOR'' group in which R' is an alkyl radical of 1 to 4 carbon atoms and R'' is an alkane di-yl radical of 2 to 4 carbon atoms or an alkylidene radical of 1 to 5 carbon atoms;

y is an integer from 0 to 3;

z is 0 or 1;

w is 0 or 1; and

the sum of z and w is 0 or 1.

34. (previously presented): The method of claim 33, wherein the cyclohexene compound is selected from the group consisting of cyclohexene, α -terpineol, terpinen-4-ol, α -terpinyl acetate, α -terpinyl propionate, α -terpinyl butyrate, 1-methyl-1-cyclohexene, 3-methyl-1-cyclohexene, 4-methyl-1-cyclohexene, methyl 1-cyclohexene-1-carboxylate, 3-methyl-2-cyclohexen-1-ol, 3-methyl-2-cyclohexen-1-one, 4-isopropyl-2-cyclohexen-1-one, 3,5-dimethyl-2-cyclohexen-1-one, 4,4-dimethyl-2-cyclohexen-1-one, isophorone, 2,6,6-trimethyl-1-cyclohexene-1-acetaldehyde, and 3,5,5-trimethyl-2-cyclohexen-1-ol.

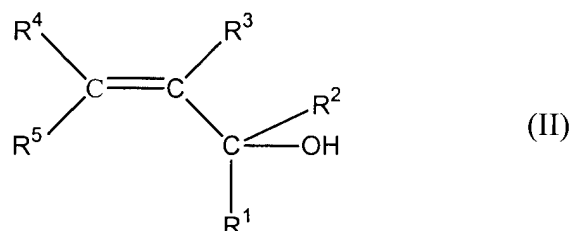
35. (previously presented): The method of claim 33, wherein the cyclohexene compound is cyclohexene.

36. (previously presented): The method of claim 31, wherein the stabilization agent is a compound comprising:

an ethylenic unsaturation not forming part of an aromatic ring; and,

a carbon atom bonded to a free hydroxy group and at least one hydrogen atom, wherein the carbon atom is in the α position with respect to the ethylenic unsaturation.

37. (previously presented): The method of claim 36, wherein the stabilization agent has the formula:



wherein:

R^1 and R^2 are both hydrogen; or one of R^1 and R^2 is hydrogen and the other forms, with the R^5 group, a $\text{C}_5\text{-C}_{10}$ ring, which may be substituted with one or more linear or branched $\text{C}_1\text{-C}_4$ alkyl groups and/or one or more $\text{C}_2\text{-C}_4$ alkylene groups; or one of R^1 and R^2 is hydrogen and the other is a $\text{C}_1\text{-C}_6$ aliphatic alkyl group, a $\text{C}_4\text{-C}_{16}$ cyclic hydrocarbon group, or a $\text{C}_6\text{-C}_{16}$ aromatic hydrocarbon group;

R^3 , R^4 , and R^5 , independently, are: hydrogen; a $\text{C}_1\text{-C}_6$ alkyl group which may be substituted with one or more OH groups and may be interrupted by one or more ether, ester or ketone groups; a $\text{C}_6\text{-C}_{16}$ aromatic hydrocarbon group; or a $\text{C}_4\text{-C}_{16}$ cyclic hydrocarbon group;

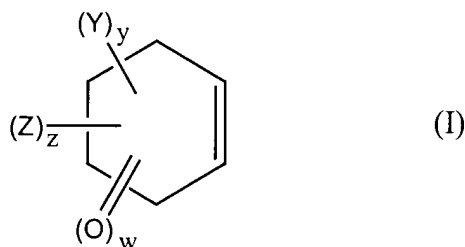
R^3 and R^4 may form a $\text{C}_5\text{-C}_{10}$ ring which may be substituted with one or more $\text{C}_1\text{-C}_4$ alkyl groups or $\text{C}_2\text{-C}_4$ alkylene groups; and

two or more carbon atoms of any $\text{C}_5\text{-C}_{10}$ ring formed with R^1 or R^2 and R^5 or with R^3 and R^4 may be bonded by a hydrocarbon bridge.

38. (previously presented): The method of claim 37, wherein R^1 and R^2 represent hydrogen, R^3 represents a methyl group, R^4 represents hydrogen or a methyl group and R^5 represents hydrogen, a methyl, ethyl or CH_2OH group.

39. (previously presented): The method of claim 37, wherein the compound of formula (II) is selected from the group consisting of allyl alcohol, methallyl alcohol, crotyl alcohol, 2-cyclohexen-1-ol, trans-2-hexen-1-ol, cis-2-butene-1,4-diol, 3-methyl-2-buten-1-ol, trans-2-methyl-3-phenyl-2-propen-1-ol, 3-buten-2-ol, carveol, myrtenol, verbenol and trans-cinnamyl alcohol.
40. (previously presented): The method of claim 39, wherein the compound of formula (II) is 3-methyl-2-buten-1-ol.
41. (previously presented): The method of claim 31, wherein the weight of the at least one stabilization agent is 0.1 to 10% of the weight of the monomers in the polymerizable mixture.
42. (previously presented): The method of claim 41, wherein the weight of the at least one stabilization agent is 1 to 10% of the weight of the monomers in the polymerizable mixture.
43. (previously presented): The method of claim 42, wherein the weight of the at least one stabilization agent is about 5% of the weight of the monomers in the polymerizable mixture.
44. (previously presented): The method of claim 31, wherein the aqueous emulsion of the polymerizable mixture is further defined as a mini-emulsion.
45. (previously presented): The method of claim 31, wherein the monomers are selected from the group consisting of alkyl acrylates, alkyl methacrylates, and mixtures thereof.
46. (previously presented): The method of claim 31, wherein the photochromic compound is selected from the group consisting of chromenes, spirooxazines and mixtures thereof.
47. (previously presented): The method of claim 31, wherein the photochemical property stabilization agent is added to the polymerizable mixture during polymerization.

48. (previously presented): The method of claim 31, wherein the photochemical property stabilization agent is added to the latex after polymerization.
49. (previously presented): A stabilized photochromic latex comprising:
 an aqueous dispersion of polymer particles resulting from the free-radical polymerization
 of one or more organic monomers containing C=C groups;
 one or more photochromic compounds; and;
 an effective quantity of at least one stabilization agent capable of stabilizing
 photochromic properties selected from the group consisting of cyclopentene
 compounds, cyclohexene compounds, cycloheptene compounds, cyclooctene
 compounds, and compounds comprising an ethylenic unsaturation not forming
 part of an aromatic ring and a carbon atom bearing a free hydroxy group, wherein
 the carbon atom is in the α position with respect to the ethylenic unsaturation.
50. (previously presented): The latex of claim 49, wherein the stabilization agent is a
 cyclohexene compound.
51. (previously presented): The latex of claim 50, wherein the cyclohexene compound has
 the formula:



wherein:

- any Y is, independently, an alkyl group of 1 to 4 carbon atoms;
 any Z is a hydroxy group, a 2-oxoethyl group, a hydroxyalkyl group of 1 to 3 carbon
 atoms, an alkoxycarbonyl group of 2 to 5 carbon atoms, or a R'COOR" group in

which R' is an alkyl radical of 1 to 4 carbon atoms and R'' is an alkane di-yl radical of 2 to 4 carbon atoms or an alkylidene radical of 1 to 5 carbon atoms;
y is an integer from 0 to 3;
z is 0 or 1;
w is 0 or 1; and
the sum of z and w is 0 or 1.

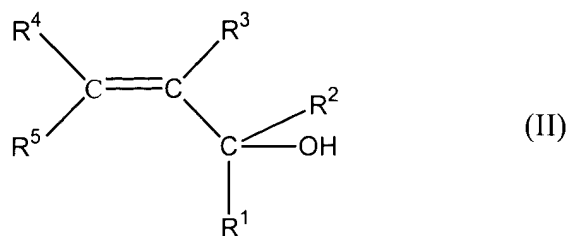
52. (previously presented): The latex of claim 51, wherein the cyclohexene compound is selected from the group consisting of cyclohexene, α -terpineol, terpinen-4-ol, α -terpinyl acetate, α -terpinyl propionate, α -terpinyl butyrate, 1-methyl-1-cyclohexene, 3-methyl-1-cyclohexene, 4-methyl-1-cyclohexene, methyl 1-cyclohexene-1-carboxylate, 3-methyl-2-cyclohexen-1-ol, 3-methyl-2-cyclohexen-1-one, 4-isopropyl-2-cyclohexen-1-one, 3,5-dimethyl-2-cyclohexen-1-one, 4,4-dimethyl-2-cyclohexen-1-one, isophorone, 2,6,6-trimethyl-1-cyclohexene-1-acetaldehyde, and 3,5,5-trimethyl-2-cyclohexen-1-ol.

53. (previously presented): The latex of claim 51, wherein the cyclohexene compound is cyclohexene.

54. (previously presented): The latex of claim 50, wherein the stabilization agent is a compound comprising:

an ethylenic unsaturation not forming part of an aromatic ring; and
a carbon atom bonded to a free hydroxy group and at least one hydrogen atom, wherein
the carbon atom is in the α position with respect to the ethylenic unsaturation.

55. (previously presented): The latex of claim 50, wherein the compounds with ethylenic unsaturation have the formula:



wherein:

- R^1 and R^2 are both hydrogen; or one of R^1 and R^2 is hydrogen and the other forms, with the R^5 group, a $\text{C}_5\text{-C}_{10}$ ring, which may be substituted with one or more linear or branched $\text{C}_1\text{-C}_4$ alkyl groups and/or one or more $\text{C}_2\text{-C}_4$ alkylene groups; or one of R^1 and R^2 is hydrogen and the other is a $\text{C}_1\text{-C}_6$ aliphatic alkyl group, a $\text{C}_4\text{-C}_{16}$ cyclic hydrocarbon group, or a $\text{C}_6\text{-C}_{16}$ aromatic hydrocarbon group;
- R^3 , R^4 , and R^5 , independently, are: hydrogen; a $\text{C}_1\text{-C}_6$ alkyl group which may be substituted with one or more OH groups and may be interrupted by one or more ether, ester or ketone groups; a $\text{C}_6\text{-C}_{16}$ aromatic hydrocarbon group; or a $\text{C}_4\text{-C}_{16}$ cyclic hydrocarbon group; and
- R^3 and R^4 may form a $\text{C}_5\text{-C}_{10}$ ring which may be substituted with one or more $\text{C}_1\text{-C}_4$ alkyl groups or $\text{C}_2\text{-C}_4$ alkylene groups; and
- two or more carbon atoms of any $\text{C}_5\text{-C}_{10}$ ring formed with R^1 or R^2 and R^5 or with R^3 and R^4 may be bonded by a hydrocarbon bridge.

56. (previously presented): The latex of claim 55, wherein R^1 and R^2 represent hydrogen, R^3 represents a methyl group, R^4 represents hydrogen or a methyl group and R^5 represents hydrogen, a methyl, ethyl or CH_2OH group.

57. (previously presented): The latex of claim 55, wherein the compound of formula (II) is selected from the group consisting of allyl alcohol, methallyl alcohol, crotyl alcohol, 2-cyclohexen-1-ol, trans-2-hexen-1-ol, cis-2-butene-1,4-diol, 3-methyl-2-buten-1-ol, trans-2-methyl-3-phenyl-2-propen-1-ol, 3-buten-2-ol, carveol, myrtenol, verbenol and trans-cinnamyl alcohol.

58. (previously presented): The latex of claim 57, wherein the compound of formula (II) is 3-methyl-2-buten-1-ol.
59. (previously presented): The latex of claim 49, further defined as comprising 0.1 to 10% by weight stabilization agent with respect to the weight of monomers in the initial mixture.
60. (previously presented): The latex of claim 59, further defined as comprising 1 to 10% by weight stabilization agent with respect to the weight of monomers in the initial mixture.
61. (previously presented): The latex of claim 60, further defined as comprising about 5% by weight stabilization agent with respect to the weight of monomers in the initial mixture.
62. (previously presented): The latex of claim 49, wherein the polymer is an alkyl polyacrylate, an alkyl polymethacrylate, or a copolymer of alkyl acrylate and alkyl methacrylate.
63. (previously presented): The latex of claim 49, wherein the photochromic compound is selected from the group consisting of chromenes, spirooxazines, and mixtures thereof.
64. (previously presented): A substrate coated with a film formed by drying a stabilized photochromic latex comprising:
an aqueous dispersion of polymer particles resulting from the free-radical polymerization of one or more organic monomers containing C=C groups;
one or more photochromic compounds; and;
an effective quantity of at least one stabilization agent capable of stabilizing photochromic properties selected from the group consisting of cyclopentene compounds, cyclohexene compounds, cycloheptene compounds, cyclooctene compounds, and compounds comprising an ethylenic unsaturation not forming part of an aromatic ring and a carbon atom bearing a free hydroxy group, wherein the carbon atom is in the α position with respect to the ethylenic unsaturation.
65. (previously presented): The substrate of claim 64, further defined as an ophthalmic lens.

RESPONSE TO THE OFFICE ACTION DATED APRIL 10, 2003

A. Status of the Claims

Claims 31-65 were pending at the time of the Action dated April 10, 2003 and have not been amended in this Response. Claims 31-65, therefore, are currently pending.

B. Submission of a Certified Copy of the Foreign Priority Document

Applicants note that the Action does not acknowledge Applicants' claim to foreign priority. Applicants submit with this Response a certified copy of foreign priority document French Application No. 01/00343, filed 11 January 2001. Applicants, therefore, request acknowledgement be made to the claim to French Application No. 01/00343.

C. The Obviousness Rejection of claims 31-65 is Overcome

1. A Summary of the Rejection and the Standard for Establishing a *Prima Facie* Case of Obviousness

The Action rejects claims 31-65 under 35 U.S.C. § 103(a) as being obvious over WO 98/50436 (WO '436) in view of U.S. Patent No. 5,702,825 to Keita *et al.* (Keita *et al.*), EP 224,123 (the '123 patent) and U.S. Patent No. 5,914,174 to Gupta *et al.* (Gupta *et al.*). In citing to the combination of these references, however, the Action neither asserts a motivation to combine the references nor provides any evidence showing the existence of a reasonable expectation of success that such combinations would work, requirements necessary to establish a *prima facie* case of obviousness. *See In re Vaeck*, 947 F.2d 488 (Fed Cir. 1991).

Instead, the Action discloses its opinion of what the references teach on an individual basis. For example, the Action contends that WO '436 discloses the use of mini emulsions for the formation of ethylenically unsaturated polymer latexes. As for the Keita *et al.* reference, the Action states that it teaches polymers useful for ophthalmic lens formation produced by reacting ethylenically saturated monomers with a cyclohexene compound. With respect to the

‘123 patent, the Action contends it teaches that the formation of ophthalmic lenses are often yellowed in color and that such yellowing can be decreased by using a cyclohexene compound in the polymeric composition. Finally, the Action states that Gupta *et al.* uses polyacrylate compositions for ophthalmic lens formation wherein a layer of the polymer is applied to a mold and dried.

Applicants respectfully traverse this rejection. Claims 31-65 are not obvious over the cited references.

It is well settled that “[t]he examiner bears the initial burden of factually supporting any *prima facie* case of obviousness. If the examiner does not produce a *prima facie* case, the applicant is under **no** obligation to submit evidence of nonobviousness.” *Manual of Patent Examining Procedure* (MPEP) § 2142 (8th Ed. Rev.) (emphasis added). To establish a *prima facie* case of obviousness, the examiner must show: (1) some suggestion or motivation, either in the references themselves or in the knowledge generally available to one of ordinary skill in the art, to modify the reference or to combine reference teachings; (2) a reasonable expectation of success; and (3) the prior art reference teaches or suggests all of the claim limitations. *Manual of Patent Examining Procedure* § 2142; *see also In re Vaeck*, 947 F.2d 488. If any one of the three elements is missing, a *prima facie* case of obviousness cannot be maintained.

With respect to the motivation to combine requirement, the MPEP states “[t]he mere fact that references can be combined or modified does not render the resultant combination obvious unless ***the prior art also suggests the desirability*** of the combination.” MPEP § 2143.01 (emphasis added). The Federal Circuit has stated that “[i]t is impermissible to use the claimed invention as an instruction manual or ‘template’ to pieced together the teachings of the prior art so that the claimed invention is rendered obvious.” *In re Fritch*, 972 F.2d 1260, 1266 (Fed. Cir.

1992). Stated another way, “[o]ne cannot use hindsight reconstruction to pick and choose among isolated disclosures in the prior art to deprecate the claimed invention.” *In re Fine*, 837 F.2d 1071, 1075 (Fed. Cir. 1988).

2. Applicants’ Claimed Invention and a Summary of the Argument

One aim of the present invention is to solve the problem of stability of the photochromic properties of a photochromic latex. *See* Specification, page 2, lines 7-9. It is known that:

The latexes obtained by conventional methods and the methods of polymerization in mini-emulsion, although giving satisfactory results when deposited and dried soon after their preparation, nevertheless have the disadvantage of losing a significant amount of their photochromic properties over time.

Specification, page 3, lines 15-19. Applicants have found a solution to this problem by providing:

A method of producing photochromic latex comprising a stabilizing agent comprising: obtaining an aqueous emulsion of a polymerizable mixture ... polymerizing the polymerization mixture to form a latex; obtaining a composition comprising a weight of least one stabilization agent capable of stabilizing photochromic properties ... and adding the composition comprising the stabilization agent to the polymerization mixture prior to or during polymerization of the polymerizable mixture or to the latex after polymerization; wherein photochromic latex comprising a stabilizing agent is produced.

Claim 31. Applicants also claim a corresponding “stabilized photochromic latex” (Claim 49) and “[a] substrate coated with a film formed by drying a stabilized photochromic latex” (Claim 64).

In contrast to Applicants’ claimed invention, the primary reference cited by the Action, WO ‘436, relates to a *non*-photochromic polymer *latex* composition. By contrast, all of the secondary references relate to *non-latex* polymer compositions. *See, e.g.*, Keita *et al.*, the ‘123 patent, and Gupta *et al.* Moreover, none of the cited references disclose or even suggest a solution to the instability problems facing photochromic latexes. Consequently, a person of ordinary skill in the art would not find any motivation to combine these references. Similarly,

there is no reasonable expectation of success that such combinations would work. Finally, it appears that the Action is using impermissible hindsight in combining these references.

3. Claims 31-65 are Not Rendered Obvious Over the Cited References

i. There is no motivation to combine the cited references

a. The Action has not met its initial burden of establishing a prima facie case of obviousness

Despite the Action's opinions about what the cited references disclose on an individual basis, the Action does not provide any basis on whether there is a motivation to combine these references. The Action cites to no passages in the cited references, no additional references, and no other evidence (either extrinsic or intrinsic) to support such a motivation to combine the references. In fact, there is no motivation to combine the cited references. Based on this lack of evidence alone, the present obviousness rejection must fall. *See In re Fine*, 972 F.2d at 1266 ("Obviousness **cannot** be established by combining the teachings of the prior art to produce the claimed invention, absent some teaching or suggestion supporting the combination.") (*citing ACS Hosp. Systems, Inc. v. Montefiore Hosp.*, 732 F.2d 1572, 1577 (Fed. Cir. 1984) (emphasis added)). If the Action is relying on personal knowledge to support a motivation to combine the cited references, Applicants request that an affidavit be prepared and submitted pursuant to 37 C.F.R. § 1.104(d)(2) to support this contention.

Accordingly, Applicants request that the present obviousness rejection of claims 31-65 over the cited references be withdrawn.

b. There is no motivation to combine WO '436 with Keita et al.

Even assuming the Action met its initial burden, which Applicants do not concede, the simple fact remains is that there is no motivation to combine the cited references. In fact, the very references cited by the Action supports Applicants' position. For example, the primary

reference cited by the Action, WO '436, discloses “methods for the formation of polymers by emulsion polymerisation and in particular to the formation of polymers under miniemulsion conditions.” WO '436, page 1, lines 3-6. In contrast to Applicants’ claimed invention, WO '436 does not teach or suggest a method of producing a **photochromic** latex. In fact, the use of a photochromic compound does not even appear to be suggested by this reference, much less a method of stabilizing the photochromic properties of such a compound.

As for the secondary references cited by the Action (Keita *et al.*, the '123 patent, and Gupta *et al.*), they do not suggest the desirability of combining their teachings with WO '436. In Keita *et al.*, for example, this reference discloses **non-latex** polymer compositions. See Keita *et al.*, Abstract. The compositions can have a component A comprising a monomer and a component B comprising an allylic derivative. *Id.* at column 2, lines 15-46. The non-latex polymer compositions may also include a photochromic compound. *Id.* at column 14, lines 53-55.

There is, however, no suggestion in Keita *et al.* that its **non-latex** polymer compositions can be used interchangeably with **latex** compositions, much less the specific latex compositions of WO '436. See MPEP § 2143.01 (“The mere fact that references can be combined or modified does not render the resultant combination obvious unless **the prior art also suggests the desirability** of the combination.”). This is especially true because the **non-latex** polymer compositions in Keita *et al.* can include photochromic compounds. In contrast, the **latex** compositions in WO '436 do not include, nor does WO '436 suggest, using photochromic compounds in the compositions.

Moreover, there is no suggestion that component B in Keita *et al.* can act as a “stabilizing agent capable of stabilizing photochromic properties.” Even if there was such a suggestion,

which Applicants do not concede, the use of a “stabilizing agent” is not even relevant, much less contemplated, by the ***non-photochromic*** latex compositions disclosed in WO ‘436. As such, it cannot seriously be maintained that there is a suggestion in Keita *et al.* to combine its teachings with those of WO ‘436. The present obviousness rejection must, therefore, fall.

c. There is no motivation to combine WO ‘436 with the ‘123 patent

The ‘123 patent discloses the use of cyclohexene compounds to reduce yellowing of bisphenol A polymer compositions. *See* the ‘123 patent, Abstract. This reference, however, does not disclose nor suggest the use of latexes, much less photochromic latexes. Similar to the Keita *et al.* reference discussed above, the ‘123 patent does not include any suggestion that its ***non-latex*** polymer compositions can be used interchangeably with the ***latex*** compositions disclosed in WO ‘436. *See* MPEP § 2143.01. Because of at least this reason, there is no suggestion in either reference to combine their teachings.

Moreover, the fact that the ‘123 patent discloses the use of cyclohexene compounds to reduce yellowing in polymerized compositions is irrelevant to the present motivation to combine issue. The yellowing problem discussed in the ‘123 patent concerns the polymerization of monomer compositions, not latexes. *See* the ‘123 patent, page 1, lines 16-20. In contrast, Applicants’ claimed invention contemplates the use of cyclohexene compounds for “stabilizing photochromic properties” of a polymer latex that comprises a photochromic compound. *See, e.g.,* Claim 31. A person of ordinary skill in the art would recognize that stabilizing photochromic properties of a ***polymer latex*** is different from preventing the yellowing of a ***polymerizable monomer composition***. *See* Specification, page 2, lines 6-9.

Moreover, the WO ‘436 reference does not even appear to be concerned with stabilizing photochromic properties. Again, this reference is directed towards ***non-photochromic*** latexes.

As such, a person of ordinary skill in the art would not be motivated to use the cyclohexene compounds taught in the '123 patent to stabilize the *non-existent* photochromic properties of the latex compositions disclosed in WO '436. In fact, the '123 patent does not appear to suggest that cyclohexene compounds can be used to stabilize photochromic properties of polymer latexes.

Because of at least these reasons, the present obviousness rejection cannot be maintained.

d. *There is no motivation to combine WO '436 with Gupta et al.*

Gupta *et al.* discloses a polymerizable resin comprising at least two (meth)acrylate compounds, at least one photochromic compound, and at least one additive. *See Gupta et al.*, column 2, lines 5-26. The Gupta *et al.* reference, however, does not disclose nor suggest the use of latexes or photochromic latexes. This reference does not even appear to suggest that its *non-latex* polymer compositions can be used interchangeably with the *latex* compositions disclosed in WO '436. *See* MPEP § 2143.01. Because of at least this reason, there is no suggestion in either reference to combine their teachings.

Because the Action has failed to establish a motivation to combine the cited references, every element required to establish a *prima facie* case of obviousness has not been met. As such, the present rejection cannot be maintained.

Accordingly, Applicants request that the rejection of claims 31-65 as being obvious over the cited references be withdrawn.

ii. *There is no reasonable expectation of success that such combinations would work*

Similar to the motivation to combine element, the examiner fails to provide any evidence, any citations to specific passages in the cited references, or any other extrinsic materials showing the existence of a reasonable expectation of success that the proposed combinations would work. *See* MPEP § 1243.02 ("The prior art can be modified or combined to reject claims as *prima facie*

obvious *as long as there is a reasonable expectation of success.*”). As such, a *prima facie* case of obviousness has not been established and the present obviousness rejection must fall. See MPEP § 2142.

Even if a *prima facie* case of obviousness were established, which is not the case, there is no reasonable expectation of success that the combination of the references would work. For example, the primary reference cited by the Action relates to a non-photochromic polymer *latex* composition (WO ‘436). By contrast, all of the secondary references relate to *non-latex* polymer compositions (Keita *et al.*, the ‘123 patent; and Gupta *et al.*). There does not appear to be any reasonable expectation of success that references directed towards *non-latex* polymers would be useful, or even applicable, to references relating to *latex* polymers. A person of ordinary skill in the art would recognize that *latex* polymer compositions are different from *non-latex* polymer compositions in appearance and chemical reactions.

As such, there is no reasonable expectation of success that the proposed combination of references would work. The present obviousness rejection, therefore, cannot be maintained.

Accordingly, Applicants request that the rejection of claims 31-65 as being obvious over the cited references be withdrawn.

iii. The use of hindsight to support the combination of references is impermissible

As can be seen by the above arguments, there is simply no motivation to combine the cited references. Moreover, there is no reasonable expectation of success that such combinations would work. It appears, therefore, that the Action is using Applicants’ claimed invention as a template to piece together the cited references to support the obviousness rejection. However, it is well-settled that the Action “*cannot* use hindsight reconstruction to pick and choose among